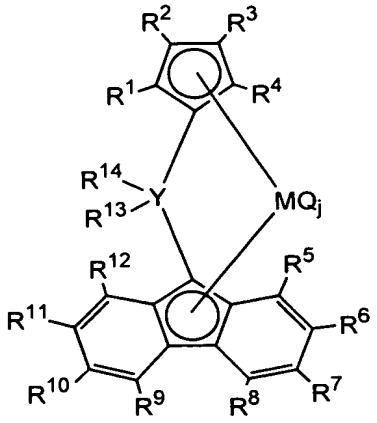
ABSTRACT

A process for producing an olefin polymer is provided, in which ethylene and at least one kind or more of monomers selected from α-olefins are polymerized by a high temperature solution polymerization in a temperature range between 120 and 300°C, in the presence of an olefin polymerization catalyst composed of a bridged metallocene compound represented by general formula [I] described below and at least one kind or more compounds (B) selected from (b-1) an organoaluminum oxy-compound, (b-2) a compound capable of forming an ion pair in a reaction with the bridged metallocene compound mentioned above, and (b-3) an organoaluminum compound. According to the high temperature solution polymerization of the present invention, it has become possible to obtain a polymer having a high molecular weight with high polymerization activity that was so far unattainable, and when the polymer is a copolymer, it is a process for producing a high molecular weight olefin polymer with a large comonomer content, a narrow composition distribution, and a narrow molecular weight distribution.



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